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VOL. XI, No. 1

SPERMATOPHYTES, MOSTLY PERUVIAN—III

BY

J. FRANCIS MACBRIDE

ASSISTANT CURATOR OF TAXONOMY

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SPERMATOPHYTES, MOSTLY PERUVIAN—III

J. FRANCIS MACBRIDE

Few if any American botanists have had my privilege of sojourning over a long period at the great herbaria of the Old World. I could easily write a book upon the happy experiences that have been mine and the thanks that I owe so abundantly to the members of the staffs at the several institutions visited. Here I must content myself with a limited mention of the many who have generously cooperated with Field Museum, to the benefit, let us hope, of science generally, in permitting the most complete freedom in carrying on the work delegated to me. The cordial friendship I have met has contributed immeasurably to the consummation of this special work.

Apart from it, I have been able to continue to some extent my interest in the flora of Peru. In presenting the following paper I acknowledge with pleasure my special indebtedness to Dr. Briquet and staff, Conservatoire Botanique, Geneva; to Dr. R. Chodat and staff at the University, Geneva; and to Professors Goebel, Ross, and Suessenguth at the Botanical Institute, Munich, at which institutions, particularly the first, the paper has evolved. As in the case of the last number of this series, I am again happy to record my thanks to Professor Diels and to Professor Pilger and their friendly associates at Berlin-Dahlem.

1. SOME PERUVIAN CONVULVULACEAE WITH A NEW VARIETY

Merremia glabra Hall. f., var. **pubescens** van Ooststr., n. var.
—Differt ramis petiolis et foliis quoad nervos paginae inferioris in eodem specimine nunc pubescentibus nunc plus minusve glabris.—Peru: Pampayacu, Hacienda at mouth of Río Chinchao, about 3,500 feet, July 19–25, 1923, *Macbride* 5045. "On sunny thickets, fls. white."

Ipomoea (sect. *Eriospermum*) **clavata** (Don) van Ooststr., comb. nov. *Convolvulus clavatus* Payón, mss. *Calonyction clavatum* Don, Gen. Syst. 4: 264. 1838. *Ipomoea lactescens* Benth. Pl. Hartw. 120. 1839; Hall. f. in Jahrb. Hamb. Wiss. Anst. 16: Beih. 3: 50. 1898.—Peru: Pozuzo, about 2,000 feet, June 20–22, 1923, *Macbride* 4671. La Merced, about 2,000 feet, Aug. 10–24, 1923, *Macbride* 5394; "on brush."

Ipomoea Plummerae Gray, Syn. Fl. N. Am. ed. 2. 2¹: Suppl. 434. 1886.

In the *Supplement* of his *Synoptical Flora of North America* (434. 1886), Asa Gray gives a diagnosis of this species, followed by a short description of *I. cuneifolia* Gray (Proc. Amer. Acad. 19: 90. 1884). In the latter he writes that this species has the "tuber, peduncles, flowers and habit of the preceding," i.e. *I. Plummerae*, but it differs in the leaves, which are "simple, cuneate, laciniate-dentate at the broad apex, tapering into a short petiole," etc.

In the collections made by Weberbauer in Peru I found two numbers (7275a and 7275), the first of which I suppose to be identical with *I. Plummerae*. The second has the cuneate leaves of *I. cuneifolia* and seems to be identical with that species or nearly allied to it.

As the two forms seem to grow together, I assume that the cuneate-leaved plants represent a variety of *Plummerae*, which I call var. *cuneifolia*, a variety probably identical with *I. cuneifolia* Gray.—Peru: Carumas, Prov. Moquegua, 2,700 m., Feb. 21–Mar. 6, 1925, Weberbauer 7275 and 7275a. "Open mixed formation. Decumbent. Tuberous. Flowers purple."

2. NEW AND OLD PERUVIAN PLANTS

Elodea Potamogeton (Bert.), comb. nov. *Diplandra Potamogeton* Bert. Merc. Chil. 612. 1829; Bull. Férus. 20: 110. 1830. *Anacharis chilensis* Planch. Ann. Sci. Nat. III. 11: 75. 1849. *Elodea chilensis* Casp. Monatsb. Berl. Acad. 47. 1857. *A. Matthewsii* Planch. op. cit. 74?

The original publication of this transferred name is valid; it is, not a nomen nudum as has been assumed. The description, in Spanish, is informal, but there is no mistaking the identity, and furthermore, this is the only *Elodea* in the region. The generic name *Philotria* Raf. is not acceptable legally in place of *Elodea*, or at least not until another congress.

Echinodorus palaefolius (Nees & Mart.), comb. nov. *Sagittaria palaefolia* Nees & Mart. Nov. Act. Acad. Nat. Cur. 11: 21. 1823. *Alisma ellipticum* Mart. in R. & S. Syst. 7²: 1607. 1830. *Echinodorus ellipticus* Micheli in DC. Monogr. 3: 51. 1881.

Since this species is known to occur in Mexico and in Uruguay as well as at various intermediate stations, the fact that it does not seem to have been recorded from Peru is annoying rather than significant. The var. *pubescens* (Mart.), comb. nov.—*E. ellipticus* (Mart.) Micheli, var. *pubescens* (Mart.) Micheli—has a scabrous-pubescent rather than glabrous inflorescence.

Bulbostylis tenuifolia (Rudge), comb. nov. *Scirpus tenuifolius* Rudge, Pl. Guian. 18. pl. 22. 1805. *Stenophyllus tenuifolius* Britton, Bull. Torr. Club 43: 448. 1916.

Bulbostylis capillaris (L.) Clarke, var. ***coarctata*** (Ell.), comb. nov. *Scirpus coarctatus* Ell. Bot. S. C. & Ga. 1: 83. 1816. *Stenophyllus capillaris* Britton, Bull. Torr. Club. 21: 30. 1894.

It is possible that the variety—with a composite umbel of many-flowered spikelets—is merely a robust form.

Pfeiffer, just before the last botanical congress (Repert. Spec. Nov. 27: 85–91. 1929 and 28: 24–26. 1930) raised a great hue and cry for the conservation of the generic name *Bulbostylis*, and with a notable display of righteousness wrote: “The [next] most essential point in nomenclature is . . . the avoidance of any useless introduction of unnecessary names.” He then proceeded to coin a superfluous name as follows: “*Bulbostylis conspicua* (Boeck.) H. Pfeiff. n. comb. vel *Stenophyllus conspicuus* (Boeck.) H. Pfeiff. n. comb.” *Bulbostylis* should be conserved, which can still be done with reason since there has not yet been a general transfer of the names to *Stenophyllus*.

Dichromena setacea (Berg.), comb. nov. *Schoenus setaceus* Berg. Act. Helv. 7: 130. 1772.

As pointed out by me in previous papers, the genera *Rynchospora* and *Dichromena* constitute in fact but a single genus, for which the latter is the prior name. After the species are all transferred, some one will probably demand the employment of the former name. Accordingly, in continuing my legal adoption of the name *Dichromena* (cf. Field Mus. Bot. 4: 165–166. 1929), I am making the above and the following new transfers of species that it has been desirable or necessary to associate with the flora of Peru.

Dichromena Linkii, nom. nov. *Rynchospora tenuis* Link, Jahrb. 3: 76. 1820, not *D. tenuis* Steud. Syn. Cyp. 135. 1855.

Dichromena barbata (Vahl), comb. nov. *Schoenus barbatus* Vahl, Eclog. 2: 4. 1798. *Rynchospora barbata* Kunth, Enum. 2: 280. 1837.

Dichromena Marisculus (Lindl. & Nees), comb. nov. *Rynchospora Marisculus* Lindl. & Nees in Mart. Fl. Bras. 2^a: 142. 1842.

Dichromena distans (Michx.), comb. nov. *Schoenus distans* Michx. Fl. Bor. Amer. 1: 36. 1803. *Rynchospora distans* Vahl, Enum. 2: 235. 1805.

Dichromena cymosa (Ell.), comb. nov. *Rynchospora cymosa* Ell. Bot. S. C. & Ga. 1: 58. 1816.

Dichromena cyperoides (Sw.), comb. nov. *Schoenus cyperoides* Sw. Prodr. 19. 1788. *Rynchospora cyperoides* Mart. Denkschr. Akad. Wiss. Muench. 6: 149. 1816-17.

Dichromena gigantea (Link), comb. nov. *Rynchospora gigantea* Link, Jahrb. 3: 76. 1820.

Dichromena triflora (Vahl), comb. nov. *Rynchospora triflora* Vahl, Enum. 2: 232. 1806.

Dichromena Schoenus, nom. nov. *Scirpus cephalotes* L. Sp. Pl. ed. 2. 76. 1762, not *D. cephalotes* Britton.

Dichromena amazonica (Poepp. & Kunth), comb. nov. *Rynchospora amazonica* Poepp. & Kunth in Kunth, Enum. 2: 292. 1837.

Dichromena corymbosa (L.), comb. nov. *Scirpus corymbosus* L. Cent. 2: 7. 1756. *Rynchospora corymbosa* Britton, Trans. N. Y. Acad. Sci. 11: 84. 1892.

Dichromena Pearcei (Clarke), comb. nov. *Pleurostachys Pearcei* Clarke, Kew. Bull. Add. Ser. 8: 41. 1908.

In a regional treatment, at least, there is no useful purpose served in maintaining the segregate genus *Pleurostachys*, the generic value of which is not on a par with that of the other genera within the tribe.

Dichromena peruviana (Clarke), comb. nov. *Pleurostachys peruviana* Clarke, Kew Bull. Add. Ser. 8: 42. 1908.

Dichromena aberrans (Clarke), comb. nov. *Rynchospora aberrans* Clarke, Kew Bull. Add. Ser. 8: 35. 1908.

This Brazilian species, allied to *D. exaltata*, has been found recently in Peru, according to Pfeiffer.

Rhodospatha Poepp. in Poepp. & Endl. Nov. Gen. 3: 91. 1845.

This genus may well be amended to include the plants that have been referred to *Stenospermantium* Schott (Gen. Ar. 70. 1858), since the latter in general has no distinction except the basal instead of lateral attachment of the ovules. If this character properly forms a basis of generic definition, other groups in the family now included under one name (as *Philodendron*, for example) should be segregated. *Rhodospatha* in this broader sense is too near *Raphidoflora* Hassk. (which no doubt should include *Afroraphidophora* Engler and *Epipremnum* Schott, also based on ovule placement), but that is entirely Old World in distribution and is usually distinguishable by its 1- or partially 2-celled ovary. The alliance of all these plants is very close to *Monstera*, but here there is the very practical distinction in the difference of leaf nervation (with one or two connecting species as

exceptions). The disposition of the several groups in the tribe may be perplexing if emphasis is placed on the one or two aberrant species uniting genera that, from a standpoint of convenience at least, should be retained, but this confusion is avoided when these aberrant species are left as such; that is, as "exceptions," which are, incidentally, rarely met with. They will also fit better into a rational scheme of classification where their position will be clearly that of connecting links of diverging groups. Accordingly, it seems most natural to merge *Stenospermantium* with *Rhodospatha* and to treat other aberrant plants (cf. Engler & Krause, Pfl. IV. 23B: 16. 1908), such as *Anepsias* Schott, *Alloschemone* Schott and *Amydrenium* Schott, also as connecting species and not as separately developed genera. The Peruvian species of *Stenospermantium* to be transferred to *Rhodospatha* are:

Rhodospatha amomifolia (Poeppig), comb. nov. *Monstera amomifolia* Poeppig, Nov. Gen. 3: 88. 1845. *Stenospermantium amomifolium* Schott, Prodr. 348. 1860.

Rhodospatha crassifolia (Engler), comb. nov. *Stenospermantium crassifolium* Engler, Bot. Jahrb. 37: 114. 1905.

Rhodospatha flavescens (Engler), comb. nov. *Stenospermantium flavescens* Engler, op. cit. 111. 1905.

Very doubtfully more than a variety of the next.

Rhodospatha Mathewsii (Schott), comb. nov. *Stenospermantium Mathewsii* Schott, Gen. Ar. 70. 1858.

Rhodospatha Spruceana (Schott), comb. nov. *Stenospermantium Spruceanum* Schott, Gen. Ar. 70. 1858.

Rhodospatha popayanensis (Schott), comb. nov. *Stenospermantium popayanense* Schott, Oesterr. Bot. Zeitschr. 9: 39. 1859.

This species, similar to the preceding but with a much shorter spadix stipe, is to be expected in Peru. The former is found also in Colombia.

Rhodospatha Weberbaueri (Engler), comb. nov. *Stenospermantium Weberbaueri* Engler, Bot. Jahrb. 37: 110. 1905.

This species, originally from Huánuco, has been found recently at La Merced in Junín by Schunke, according to Professor Krause.

Anthurium Burchellianum (Engler), comb. nov. *A. panduratum* Mart. var. *Burchellianum* Engler, Pfl. IV. 23B: 279. 1905.

Rather similar to *A. clavigerum* Poepp. & Endl., but the petioles shorter, the leaf divisions often fewer, and the peduncle twice and

the spadix half as long. Huber, who found it in eastern Peru, noted the leaves as attaining a width of 1 m.

Xanthosoma Poeppigii Schott, var. **mafaffa** (Schott), comb. nov. *X. mafaffa* Schott, *Araceen Betreff.* 2: 5. 1855.

X. Poeppigii was published a year earlier than *X. mafaffa*. Engler in *Flora Brasiliensis* treated the former as a variety of the latter. In the var. *mafaffa* the basal leaf lobes are a little introrse and the tube of the spathe is yellowish green.

Paepalanthus peruvianus (Ruhl.), comb. nov. *Syngonanthus peruvianus* Ruhl. *Pflanzenr.* IV. 30: 253. 1903.

The genus *Syngonanthus* was established by Ruhland (op. cit. 30) to include those species of *Paepalanthus* with more or less connate (at the middle) petals, in the case of the female flowers. This seems to me to be a character that serves most usefully as a means of grouping merely sectionally the supposedly related forms. I think the natural genera in the family are defined only by the variation in the number of the stamens and by the number of the anther cells. On this basis *Blastocaulon* Ruhl. (op. cit. 223) and *Phylodoce* Mart., widely separated by Ruhland because the petals of the latter are partially adnate, are to be merged. The only character in this case remaining to *Phylodoce* that defines it in contrast to *Tonina* Aubl. is the presence of well-developed petals; and in the otherwise similar *Lachnocaulon* Kunth the petals are reduced to hairs. These four groups defined as genera constitute, therefore, from a purely disinterested standpoint, one natural genus. As they exhibit some habitual differences, their maintenance in regional treatments may sometimes be convenient.

Dichorisandra hexandra (Aubl.) Standley, var. **persicariaefolia** (Clarke), comb. nov. *D. Aubletiana* R. & S., var. *persicariaefolia* Clarke in DC. *Monogr.* 3: 274. 1881.

Apparently the species is represented in Peru only by this form with transversely striate leaves, which perhaps is a distinct species. I collected it in Junín at La Merced.

Dichorisandra Ulei, nom. nov. *D. longifolia* Ule, *Verh. Bot. Verein Brandenb.* 50: 71. 1908, not Martens & Gal., 1842.

Distinguished by Ule from *D. ovata* Mart. by the longer and glabrous leaves. It may be only a variant of *D. thyrsoiflora*, which typically, however, has leaves gradually narrowed to a petiole, a subpaniculate inflorescence, and obtuse petals. The species of the genus are either poorly defined or poorly understood.

Juncus Liebmanni, nom. nov. *Juncus brevifolius* Liebm. Vid. Meddel. For. Kjöben. 40. 1850, not Hoffm. & Link ex Rostk., 1801.

Although Buchenau has proposed two forms of this Mexican and Ecuadorian species as varieties, his name for the typical state (var. *mexicana*) has already been used in the genus. His other variety represents the Ecuador plant, perhaps distinct.

Fortunatia, gen. nov. *Scilla* L. sect.? *Hesperoscilla* Benth. in Benth. & Hook. f. Gen. 3: 815. 1883.

The type is:

Fortunatia biflora (R. & P.), comb. nov. *Scilla biflora* R. & P. Fl. Peruv. 3: 69. pl. 102. 1802. *Ornithogalum biflorum* Don in Sweet, Br. Fl. Gard. Ser. 2: 4. pl. 246. 1838.

Bentham, evidently with hesitancy, referred this Peruvian lily to *Scilla* but called attention to its discrepant characters—the 3-ovulate cells, the complanate filaments, and the open inflorescence of geminate, long-pediceled flowers. It is more diverse from *Ornithogalum*. Indeed, from Krause's key (Pflzf. ed. 2. 15a: 243–254), there appears to be no reason for excluding *Fortunatia* from the Asphodeloideae where it would find a place in the Chlorogalinae and be no more aberrant than in the Scilloideae. As genera in the Liliaceae are commonly accepted, this plant constitutes most properly and conveniently a generic entity differing technically and in aspect from the exclusively Old World groups *Scilla* and *Ornithogalum*. Since neither custom nor rule requires the advancement of the sectional name, I have proposed *Fortunatia* in well-merited commemoration of the work of the Peruvian botanist, Fortunato Herrera. Professor Herrera has kindly sanctioned the choice.

Zephyranthes tubiflora (L'Hér.) Schinz, var. *flammea* (R. & P.), comb. nov. *Amaryllis flammea* R. & P. Fl. Peruv. 3: 56. pl. 286. 1802. *Z. flammea* Baker, Amaryl. 37. 1888.

Possibly this is a color form, but I have seen no specimen. *Z. flava* (Herb.) Baker appears to be scarcely distinct specifically, since its only noteworthy difference is the absence of scales in the perianth tube. *Z. Beustii* Schinz (Viertelj. Zür. Nat. Ges. 424. 1915) seems, from character, to be indistinguishable from *Z. flava*.

Zephyranthes Briquetii, spec. nov.—Tota planta pygmaea prostrata 5–8 cm. longa; bulbi anguste ovato-oblongi 8 mm. diam. in collum circa 1–2 cm. longum attenuati; foliis 2–3 linearibus 3–6 cm. longis circa 1 mm. latis ad apicem subulato-acuminatis; scapo 1–3 cm. longo unifloro; spatha membranacea fere ad basin bifida circa 1.5 cm. longa; pedicello 3–4 mm. longo; ovario 6 mm. longo; perigonio albo (interdum violaceo-maculato) circa 2 cm.

longo, tubo gracili circa 5 mm. longo in faucem subabrupte ampliato, laciniis subaequalibus ut videtur subrotundatis et inter se connatis; filamentis liberis basin versus dilatatis circa 3 mm. longis ad apicem tubi affixis; stylo stamina aequante vel superante, stigmatе trilobato-folioso.—Peru: With cushion and rosette plants, Carumas, Prov. Moquegua, Feb. 27, 1925, *Weberbauer 7322* (type, Field Museum).

Notwithstanding the large number of species of *Zephyranthes* described in recent years, this little Peruvian one seems to be referable to none of them. Perhaps it is as near *Z. gracilis* Herb. (Amaryl. 172. pl. 29. 1837) as any species, but its differently shaped flowers and much shorter style with foliose stigmas readily separate it. The last character apparently has not been described for any species with the habit of *Z. Briquetii*, although it is entirely characteristic for the genus. Dr. Weberbauer observed that the leaves and flowers were both prostrate.

In studying this collection at Geneva, Dr. Briquet kindly verified my analysis and I welcome the opportunity to associate his name with an apparently unclassified plant.

Stenomesson Elwesii (Baker), comb. nov. *Callithauma viridiflorum* (R. & P.) Herb., var. *Elwesii* Baker, Gard. Chron. n. s. 9: 756. 1878. *S. viridiflorum* (R. & P.) Benth., var. *Elwesii* Baker, Amaryl. 116. 1888.

S. viridiflorum with a merely crenate stamineal cup and *S. Elwesii* with the cup deeply 6-cleft and its lobes quadrate and emarginate must be treated as distinct if there is any taxonomic significance in extreme variation in the nature of this organ. Otherwise a number of Peruvian species must be regarded as variants.

Stenomesson viridiflorum (R. & P.) Benth., var. **angustifolium** (Herb.), comb. nov. *Callithauma angustifolium* Herb. Bot. Mag. 67: pl. 3866. 1841.

Baker suggested (Amaryl. 116. 1888) that this form could be regarded as a variety, but he did not make the transfer. Compared with the typical state of the species, its leaves are narrower, its stamens shorter than the perianth, and its style exserted, all characters which often are variable in the genus and family.

Stenomesson Macleanicum (Herb.), comb. nov. *Clitanthes Macleanica* Herb. Bot. Reg. 25: Misc. 87. 1839. *Coburgia Macleanica* Herb. op. cit. 28: Misc. 55. 1842.

Similar to *S. luteum* (Herb.) Baker, but the scape 1-flowered and the stamineal cup truncate between the short but slender filaments. Both these species have been confused with *S. recurvatum*, which has elongate filaments and several reddish-yellow flowers.

Stenomesson pauciflorum (Lindl.) Herb., var. **curvidentatum** (Herb.), comb. nov. *S. curvidentatum* Herb. Bot. Mag. 53: pl. 2640. 1826.

Apparently like the type, but the perianth slender and the bifid staminal teeth elongate and curved.

Stenomesson variegatum (R. & P.), comb. nov. *Pancratium variegatum* R. & P. Fl. Peruv. 3: 55. 1802. *P. incarnatum* HBK. Nov. Gen. 1: 280. 1815. *S. incarnatum* Baker, Saund. Ref. Bot. sub pl. 308. 1873.

Variable, particularly in color, and a number of forms have been proposed as species.

Hymenocallis narcissiflora (Jacq.), comb. nov. *Pancratium narcissiflorum* Jacq. Fragm. 86. pl. 138. 1809. *P. calathinum* Ker, Bot. Reg. 3: pl. 215. 1817. *H. calathina* Nichols. Dict. Gard. 2: 165. 1886.

This beautiful plant was introduced in 1794 but has scarcely been known except in cultivation. According to Herbert, it came from the Andes of Bolivia or Peru.

Hymenocallis pedunculata (Herb.), comb. nov. *Ismene pedunculata* Herb. Amaryl. 222. pl. 35. 1837. *I. Macleana* Herb. Bot. Mag. 65: pl. 3675. 1839. *H. Macleana* Nichols. Dict. Gard. 2: 165. 1886.

Similar to *H. narcissiflora* but for the straight, slender, and much shorter tube, the linear segments, and the shorter (about 3.5 cm.) cup.

Hymenocallis longipetala (Lindl.), comb. nov. *Elisena longipetala* Lindl. Bot. Reg. 24: Misc. 79. 1838.

Hymenocallis sublimis (Herb.), comb. nov. *Elisena sublimis* Herb. Bot. Mag. 67: sub pl. 3873. 1841.

It is almost amazing that these plants have not before been included in *Hymenocallis*, where they so obviously belong. Herbert himself in Bot. Reg. 25: Misc. 142. 1839, and again in Saund. Bot. Ref. 4: pl. 264. 1871 called attention to their generic similarity. *H. deflexa* (Herb.) Baker, a typical *Hymenocallis*, has been produced by hybridizing *H. narcissiflora* and *H. longipetala*.

Urceolina peruviana (Presl), comb. nov. *Sphaerotele peruviana* Presl, Rel. Haenk. 1: 119. pl. 16. 1827. *S. coccinea* Link, Kl. & Otto, Ic. pl. 38. 1840. *Pentlandia miniata* Herb. Bot. Reg. 25: pl. 68. 1839. *U. miniata* Benth. & Hook. Gen. Pl. 3: 732. 1883.

When Link, Klotsch and Otto described *S. coccinea* they were concerned only with distinguishing their plant from *S. peruviana*, and so far as description and plate indicate, there is no reason whatsoever to question their judgment that the plants are generically the

same. Furthermore, there seems also to be no real specific difference. Nevertheless every one since Bentham has regarded the Presl plant as a species of *Stenomesson* and referred *S. coccinea* to *U. miniata*. Presl makes no mention of the stamineal cup that typifies the former genus (although he characterizes the floral structure of his plant in detail), nor does the plate show one. There appears, therefore, to be no reasonable doubt that these three plants are congeneric and conspecific. The flowers, as Herbert long ago remarked, simulate those of *Stenomesson croceum*, so weakly developed is the urceolate character that for other species so readily marks the genus, but, lacking the stamineal cup, the plant is best retained in *Urceolina* and regarded as a connecting species.

Urceolina urceolata (R. & P.), comb. nov. *Crinum urceolatum* R. & P. Fl. Peruv. 3: 58. pl. 287. 1802. *U. pendula* Herb. Amaryl. 193. 1837.

This species is readily known by its almost filiform, green tube.

Phaedranassa dubia (HBK.), comb. nov. *Haemanthus dubius* HBK. Nov. Gen. 1: 281. 1816. *Crinum quitense* Spreng. Syst. 2: 55. 1825. *P. chloracea* Herb. Bot. Reg. 31: pl. 17. 1845.

This is an Ecuadorian species, well marked by its red flowers deeply stained with green at the tip.

Nothoscordum fictile, spec. nov., bulbo ovoideo 2–3 cm. crasso collo longo (1–1.5 dm.) instructo; caulibus brevissimis ut videtur nullis vaginis foliorum omnino involutis; foliis prostratis lineariblongis anguste longiacuminatis 1–2 dm. longis, 4–10 mm. latis; pedicellis flexuosis gracilibus valde inaequalibus 1–2 cm. longis; floribus albis 4–5 mm. longis; segmentis oblongo-ellipticis ad basin breviter connatis, filamentis subulatis circa 2.5 mm. longis; antheris brunneis vix 1 mm. longis; stylo vix 1 mm. longo; capsula immatura 4 mm. longa ut videtur subovoidea.—Peru: Carumas, Moquegua, Feb. 21–Mar. 6, 1925, *Weberbauer 7262* (type, Field Museum).

Among the species included in Beauverd's painstaking synopsis of the genus (Bull. Herb. Boiss. II. 8: 993–1007. 1908)—which, by the way, is not mentioned in the recent edition of the Pflanzenfamilien along with other omissions, not to mention commissions, including the too frequent violation of the International Rules of Botanical Nomenclature—*N. fictile* is not especially dissimilar to *N. sessile* (R. E. Fries) Beauv., which heretofore was unique in habit. The latter, however, has narrower leaves, a much longer style (about twice as long as the ovary), and smaller fruit. So far as known, it is Argentine.

Dioscorea monadelphoides, nom. nov. *Helmia monadelpha* Kunth, Enum. 5: 421. 1851, not *D. monadelpha* Griseb. 1875. *D.*

monadelpha Pax, Pflanzenf. 2⁵: 133. 1888. *D. subhastata* Vell. Fl. Flum. 10. pl. 121. 1827?

Kunth as recently as 1924 (Pflanzenr. IV. 43: 126) has used the name of Pax for this plant, when modern custom in nomenclature clearly requires that the right to the name be restricted to the species of Grisebach. The Vellozo name, since its application is questionable and not determinable, should be dropped.

Nemastylis Huyanae, spec. nov., adscendens-erecta glaberrima; bulbo ovoideo-conico, circa 2 cm. longo et 1.5 cm. crasso, tunicis fusciscentibus exterioribus abrupte subulato-caudato-acuminatis; caulibus 1.5-3 dm. longis plerumque simplicibus subtortuosis; foliis 2 (1 radicali) 1.5-4 dm. longis, ad basin et versus apicem subulatis attenuatis ad 6 mm. latis; inflorescentiis terminalibus; spathis subaequalibusque similibus acutis circa 4.5 cm. longis, albido-papyraceis; floribus circa 4, mediocriter exsertis, subviridibus atque definite purpureo-maculatis circa 12 mm. longis; lobis anguste obovatis; filamentis in tubum gracilem connatis; antheris vix 4 mm. longis, plus minusve tortis; styli ramis 2-partitis antheris paullo longioribus; pedicellis gracilibus circa 1.5-2 cm. longis; capsulis ut videtur ad basin acutis.—Peru: Matucana, Macbride & Featherstone 469 (type, Field Museum).

Apparently this species is related to *N. nana* Wats., which is entirely different in habit. The few species known with greenish and spotted flowers are not Peruvian and appear to be essentially different from this plant. The name commemorates King Huyana, father of the last Inca kings, Huascar and Atahualpa.

N. Pearcei Baker, or rather a variant of it, also was collected at Matucana. The specimens have the large purple flowers and the long anther column of that species, but the anthers are longer than the style branches.

Tigridia lobata (Herb.), comb. nov. *Hydrotaenia lobata* Herb. Bot. Reg. 30: Misc. 66. 1844.

Similar to *T. grandiflora* (Cav.) Diels but apparently distinct, the flowers campanulate, with oblong-cuneate erect segments densely brown-spotted at base.

Costus amazonicus (Loes.), comb. nov. *Costus Malortieanus* Wendl., var. *amazonicus* Loes. Notizbl. 10: 710. 1929.

As species in *Costus* are at present defined, this Peruvian plant seems to exhibit characters that give it that rank.

Heliconia Schumanniana Loes. Bot. Jahrb. 54: Beibl. 117: 12. 1916. *H. Schumanniana* Loes., var. *basirubra* Loes. loc. cit.

This is a species of *Heliconia* that admittedly shows considerable variation in the color of the bracts and flowers, and the fact raises

the question whether many of the twenty collections recorded as distinct species in Peru are not rather similar color variants in at least some instances. However this may be, the following color forms of this plant may take that taxonomic status.

Heliconia Schumanniana Loes., forma **apicirubra** (Loes.), comb. nov. *H. Schumanniana* Loes., var. *apicirubra* Loes. Bot. Jahrb. 54: Beibl. 117: 12. 1916.

Heliconia Schumanniana Loes., forma **acreana** (Loes.), comb. nov. *H. Schumanniana* Loes., var. *acreana* Loes. loc. cit.

Renalmia cernua (Sw.), comb. nov. *Costus cernuus* Sw. ex R. & S. Syst. 1: 25. 1817.

This unusual species, with the aspect of *Costus*, has, apparently, never been "properly" christened, that is, in accord with the usage of modern nomenclature.

Monotagma spicatum (Aubl.), comb. nov. *Maranta spicata* Aubl. Hist. Pl. Gui. 1: 4. 1775. *Phrynium Parkeri* Rosc. Monandr. Pl. pl. 42. 1828. *Monotagma Parkeri* Schum. Pflanzenr. IV. 48: 168. 1902.

The Peruvian plant seems to be identical with the type of the species from French Guiana, a not particularly remarkable fact and yet at the same time not particularly usual. No other *Monotagma* known in Peru has pilose-annulate petioles.

Hedyosmum Kanehirae, spec. nov., arbuscula ad 5 m. alta; ramulis subquadrangulatis dense verruculosus; foliis numerosis rigido-coriaceis opacis breve (3–6 mm.) petiolatis glabris minute denseque crenato-denticulatis oblongo- vel lanceolato-ellipticis, basi subacutis, apice abrupte obtuseque acuminatis, plerumque circa 6.5 cm. longis et 2.5–3 cm. latis; nervis lateralibus subtus mediocriter prominentibus et plus minusve reticulatis; floribus masc. ignotis, cymulis fem. racemoso-spicatis subapproximatis 4–5 mm. longis, 3–4 mm. latis; bracteis drupas subaequantibus vel paullo brevioribus; drupis nigris trigonis acutis 1.5 vel vix 2 mm. longis.—Peru: Pan de Azúcar, Huánuco, *Sawada* 64 (type, Field Museum).

Having had the pleasure recently of naming a species for Mr. Sawada, well merited by his active interest in the flora of Peru, I dedicate this *Hedyosmum* to his friend, Dr. Kanehira, who has kindly shared his collections and those of Sawada with Field Museum. The species, among Peruvian ones, resembles most *H. Lechleri* Solms, from which its scurfy branchlets, small elliptic leaves, and tiny black drupes easily separate it. These characters in conjunction with its glabrous leaves appear to distinguish it from all species.

Hedyosmum Huascari, spec. nov., ut videtur dioicum; ramulis subteretibus striatis glabris; petiolis circa 5 mm. longis; foliis ovato-ellipticis, vix acutis, rigido-coriaceis glabris obscure denseque denticulatis plerumque circa 6 cm. longis et 2-2.5 cm. latis; venis haud prominentibus supra vix notatis; spicis masculis ignotis; cymulis spicato-aggregatis, 5-6 mm. longis, 3-4 mm. latis; bracteis drupis brevioribus; drupis pallide brunneis circa 3.5 mm. longis.—Peru: above Tabaconas, Cajamarca, *Weberbauer 6113* (type, Field Museum).

Similar to *H. Lechleri*, but apparently distinguishable by its coriaceous and broader, obtusish leaves. Its name commemorates Huascar, son of the Inca king Huyana. He died in battle over the kingdom inherited jointly with his brother Atahualpa.

The species of *Hedyosmum* are obscure in character. While proposing the above plants as new, I am (as usual) unable to distinguish some of the species described by others. For example, the characters relied upon by Solms to distinguish *H. integrum* Cord. and *H. Sprucei* Solms from *H. racemosum* (R. & P.) G. Don, seem, at least in part, explained as degrees of maturity. They may be varieties of one species, but more material is needed than the types or cotypes seen by me to decide this. Some forms of this group appear to approach *H. arborescens* Sw. too closely. Melchior (Notizbl. 9: 1036. 1926) has called attention to the weak distinction between *H. racemosum* and *H. brasiliense* Mart. Besides my species and *H. racemosum*, there are perhaps four others in Peru that are fairly well marked: *H. scabrum* (R. & P.) Solms, *H. Dombeyanum* Solms, *H. Lechleri* Solms and *H. glaucum* (R. & P.) Cord.

Clarisia nitida (Allem.), comb. nov. *Soaresia nitida* Allem. Palestr. Sc. Rio Jan. 142. pl. 1, 2. 1857 (i.e., Revista Braz. 1: 209. 1857).

A specimen (*Ducke 16606*) of this desirable timber tree of Brazil, the "guariuba," in herb. Delessert (examined by the courtesy of the Director, Dr. Briquet) was distributed as *Clarisia racemosa* R. & P. I judge from the original description and plate that it is the tree described by Allemão, loc. cit. Certainly it is not the tree of Ruiz and Pavón, the "tulpay" of Peru, a tree also of value.

Fruiting material of the latter (as well as of *C. biflora* R. & P.) is preserved in herb. Boissier of the University, Geneva, and through the kindness of Professor Chodat I have been able to study it also. It has rather thin, elliptic, acuminate leaves about two decimeters long by half as broad, glabrous and smooth above but the lateral nerves obvious, these with the midrib prominent beneath and shortly rusty-villous. The fruiting spikes are 2-3 cm. long, the sessile,

closely crowded, velvety-puberulent, globose fruits, apparently nearly mature, only 5–6 mm. in diameter. These characters are strikingly at variance with those of the Brazilian tree with so much smaller, glabrous leaves and large, glabrous fruits. The latter may resemble more *C. biflora* R. & P. with large (2 cm. in diameter), somewhat verruculose fruits borne on stout pedicels about 5 mm. long. The very reticulate-veined, lustrous, subcoriaceous leaves of this species are about 1.5 decimeters long by half as broad, abruptly caudate-acuminate, and glabrous.

Helicostylis tomentosa (Poepp. & Endl.), comb. nov. *Olmedia tomentosa* Poepp. & Endl. Nov. Gen. 2: 32. pl. 145. 1838. *H. Poepigiana* [Mart.] Tréc. Ann. Sci. Nat. III. 8: 134. 1847.

Staminate specimens of this tree are doubtfully distinguishable from *Perebea*, and it is very probable that the genus, along with many others in the family, will some day be regarded as having no more than an academic interest, treated as sections of a few more naturally defined groups.

Sorocea Sprucei (Baill.), comb. nov. *Pseudosorocea Sprucei* Baill. Adans. 11: 296. 1875.

This species was described as glabrous, but two specimens of the type collection—*Spruce 4483* from Tarapoto—which I have seen have minutely pubescent branchlet tips and petioles, with more or less pubescence also on the under leaf surfaces. Except for the pubescence, it resembles generally *S. muriculata* Miq.

Pseudolmedia Huberi, nom. nov. *Pseudolmedia obliqua* (Hub.) Ducke, Arch. Jard. Bot. Rio 3: 31. 1922, not *P. obliqua* (Karsten) Benth. & Hook.

This Amazonian tree, since its original name is already pre-occupied in the genus, may be rechristened as above, in memory of the capable Swiss botanist who, in a remarkably short time and under discouraging conditions, did so much toward the classification of the plants of the region.

Pseudolmedia laevis (R. & P.), comb. nov. *Olmedia laevis* R. & P. Syst. 258. 1798.

The material seen by me is young or imperfect, but the species seems without question referable to this genus.

Ogcodeia Ulei (Warb.), comb. nov. *Acanthosphaera Ulei* Warb. Verh. Bot. Ver. Brandenb. 48: 150. pl. 2. 1907. *Naucleopsis Ulei* Ducke, Arch. Jard. Bot. Rio 3: 38. 1922.

Ogcodeia caloneura (Hub.), comb. nov. *Olmedia*(?) *caloneura* Hub. Bol. Mus. Pará. 5: 336. 1909. *Naucleopsis caloneura* Ducke, Arch. Jard. Bot. Rio 3: 38. 1922.

Professor Mildbraed has recently revived and redefined the genus *Ogcodeia* Bur. The first of the above species is Peruvian. It may be distinguished readily from the other species definitely known from that country by its broad leaves with more numerous nerves (25-30). The second, Brazilian, suggests *O. Tessmannii* Mildbr. of Peru, but its bracts and young parts are puberulent-tomentose.

Perebea australis (Hemsl.), comb. nov. *Castilla australis* Hemsl. in Hook. Icon. 7: pl. 2676. 1901.

Dubiously enough I am transferring this plant, which I have not seen, from *Castilla*. Several factors induce me to do so: it is, presumably, from southern Peru; there is no reason to question the accuracy of the plate or the description; *Castilla* is otherwise unknown from Peru, but *Perebea* is represented there by species remarkably similar. The latter genus is distinguishable from the former particularly by its short style with short stigma, characters well delineated in the plate of *P. australis*. Unfortunately only pistillate inflorescences are known, so the other distinctive character of *Castilla*, i.e. the presence of scales among the staminate flowers, can not be proved; but its style is certainly the typical style of *Perebea*, and this genus becomes very weak indeed if this tree can not be referred there. Accordingly I am transferring it as indicated, notwithstanding its inclusion by Pittier in *Castilla* in his revision of the genus (Contr. U. S. Nat. Herb. 13: 7. 1910).

Phrygilanthus longebracteatus (Desr.), comb. nov. *Loranthus longebracteatus* Desr. in Lam. Encyc. 3: 599. 1792. *L. glaucus* R. & P. Fl. Peruv. 3: 45. pl. 275. 1802. *L. corymbosus* F. G. Dietr. Vollst. Lexic. Gaertn. Nachtr. 4: 468. 1815-21. *P. corymbosus* Eichl. in Mart. Fl. Bras. 5²: 46. 1868.

This well-defined Peruvian species has been re-collected (det. Krause) by Raimondi and Weberbauer, the latter's number 2489 from the department of Ancash under the native name "pupa."

Oryctanthus ovalifolius (R. & P.), comb. nov. *Loranthus ovalifolius* R. & P. Fl. Peruv. 3: 50. pl. 177. 1802.

As suggested by Eichler (in Mart. Fl. Bras. 5²: 91. 1868), this can scarcely be referred to *O. florulentus* (Rich.) Urban, that is, *O. ruficaulis* (P. & E.) Eichler. It is glabrous, simple-stemmed, and alternate-leaved.

Phthirusa paniculata (HBK.), comb. nov. *Loranthus paniculatus* HBK. Nov. Gen. 3: 442. 1820. *L. conduplicatus* HBK.

op. cit. 441. *L. Theobromae* Willd. ex R. & S. Syst. 7: 132. 1829.
P. Theobromae Eichl. in Mart. Fl. Bras. 5²: 56. 1868.

Accepting Eichler's conclusion that the above names refer to the same species, I take up the earliest and choose *paniculatus*, as it describes the diagnostic feature of the plant.

Acrodiclidium limbatum (Nees), comb. nov. *Nectandra limbata* Nees, Linnaea 21: 509. 1848. *A. limbosa* [R. & P.] Mez, Berl. Jahrb. 5: 89. 1889.

The Nees name is based on a specimen by Tafalla from Tacna, Peru. Mez refers doubtfully to *Nectandra* another collection from Tarma that Nees, hesitatingly, included in his species. In any case, the Nees name is the first validly published, whether or not restricted to the Tacna tree.

The species is one of a number illustrated by Ruiz and Pavón in their Laurograph or in the extremely limited edition of volume four of their well-known *Flora of Peru and Chile*. Most of the names signed to the plates were taken up by later authors as written and usually before another name had been validly published for the same plant. There are some instances, however, in which the name was either changed (as here) when finally published or separate valid publication made without reference to the Ruiz and Pavón work. In these latter cases precision if nothing else seems to require the use of the name first validly published. Accordingly as above I accept the name as actually published and not as written by Mez.

Persea Ruizii, nom. nov. *P. ferruginea* [R. & P.] Mez, Berl. Jahrb. 5: 154. 1889, not HBK. Nov. Gen. 2: 159. 1817.

Mez erred in publishing for Ruiz and Pavón in *Persea* a name that was already in valid use in that genus. To avoid the conflict he changed the established name(!) to *P. Humboldtii* Mez.

Ocotea cuneata (Nees), comb. nov. *Oreodaphne cuneata* Nees, Syst. Laur. 385. 1836. *Ocotea cuneifolia* [R. & P.] Mez, Berl. Jahrb. 5: 259. 1889.

Here is another instance in which the name in use is not the one first published validly.

Ocotea Poeppigiana (Nees), comb. nov. *Oreodaphne Poeppigiana* Nees, Syst. Laur. 404. 1836. *Ocotea multiglandulosa* [R. & P.] Mez, Berl. Jahrb. 5: 280. 1889.

And this is a further example of a name technically never published having supplanted one proposed validly. The species in exact character approaches *Phoebe*, and is one of many that illustrate

the fundamental unity of the four or five groups traditionally accepted as "genera."

Ocotea sublanuginosa (Nees), comb. nov. *Oreodaphne sublanuginosa* Nees, *Linnaea* 21: 515. 1848. *Ocotea ovalifolia* [R. & P.] Mez, *Berl. Jahrb.* 5: 261. 1889.

Nees having published this species before Mez took up the name of Ruiz and Pavón, the former's name, of course, must be used.

Nectandra acuminata (Nees & Mart.), comb. nov. *Persea acuminata* Nees & Mart. in Nees, *Syst. Laur.* 170. 1836. *N. acutifolia* [R. & P.] Mez, *Berl. Jahrb.* 5: 409. 1889.

This shrub or small tree has been collected in Peru near Monzón by Weberbauer (det. Mez) and in the department of Cajamarca by Raimondi (det. Schmidt).

The laurels of Peru comprise an interesting group of shrubs and trees, some of the latter magnificent. When Mez monographed the family, he did, it seems to me from a rather casual knowledge of the Peruvian species, a beautiful work, painstaking and, for its day, conservative. He brought order out of near-chaos and gave what is in all probability a classification essentially natural. But, as he himself indicated, the generic lines, especially as concerns *Persea*, *Phoebe*, *Nectandra*, and *Ocotea*, are broken by species that in one or more essential characters do not entirely conform. As more species become known, more modifications will in all probability be disclosed and thereby prove more definitely that certain generic characters regarded as fundamental, such as the degree of development of staminodia and the position and relative position of anther cells, are themselves merely variable characters. If such is the case, and in my opinion even if it were not, these characters would serve a more useful purpose and be interpreted more accurately if they were permitted to define merely sections of a generic unit where they would still express the apparent group relationships. The fact that there are no good concomitant characters of fruit or foliage, all species considered in the genera mentioned, suggests very strongly that the really natural limitations of the group or groups have even yet not been correctly defined. Therefore it may be hoped that the next monographer of the laurels will, even as Mez, break from tradition, and classify the group on a broader, more practical, and probably more natural basis. Were the genera not so particularly drawn, the rather clear vegetative characters of many species, if indeed not of all proper species, would permit of their determination in any condition. The situation now, to anyone but perhaps a professional

taxonomist, is open to ridicule: they are among the most conspicuous trees of the American tropics, but when not in flower, scarcely a man can venture to state with certainty even a generic name.

Fortunately more and more students believe that classification of flowering plants can serve a dual purpose, philosophical and economical, without any sacrifice of the former. When the results of this belief become manifest, then, and only then, will the *raison d'être* of the science be satisfied. A taxonomy limited in usefulness is unsatisfactory. The present accepted classification of the American laurels is a pointed illustration.

Calandrinia ciliata (R. & P.) DC., var. *Menziesii* (Hook.), comb. nov. *Talinum Menziesii* Hook. Fl. Bor. Amer. 1: 223. pl. 70. 1833. *C. caulescens* HBK. var. *Menziesii* (Hook.) Gray, Proc. Amer. Acad. 22: 277. 1886.

The identification of *C. ciliata* (R. & P.) DC. Prodr. 3: 359. 1828, has been impossible from the meager description. There are in herb. Delessert three specimens collected by Pavón that, though unnamed or not so labeled, seem to me to represent the plant described as *Talinum ciliatum*. Unfortunately, one specimen so labeled is certainly not that species, as it has a totally different inflorescence and is quite glabrous. The rest of the material, however, fits the description, and I can detect no differences between it and *C. caulescens* HBK., as that later described species has come to be interpreted over its wide range from California to Peru. The more common form of western North America with more numerous stamens (often) and larger flowers must, therefore, be transferred to the first specific name, as indicated above. I think it is more than probable that *Phacosperma peruviana* Haw., *C. Phacosperma* DC., that is, is the same, in spite of its 13 stamens, as the number of stamens is known to be variable. Notwithstanding its name, it is doubtfully Peruvian.

Calandrinia crenata (R. & P.), comb. nov. *Talinum crenatum* R. & P. Syst. 115. 1798.

This species is apparently unknown except for the original collection, and except for the crenulate petals it is scarcely distinguishable from the next.

Calandrinia Ruizii, nom. nov. *Talinum polyandrum* R. & P. Syst. 115. 1798, not *C. polyandra* Benth.

This seems to be related to *C. grandiflora*, but is smaller in all its parts. It therefore approaches *C. adenosperma*, recently segregated by Johnston, but the seeds, though minutely white-hispidulous,

are eglandular. It has been found near Lima, and re-collected near Arequipa, the type region.

Calandrinia quivensis, spec. nov., annua (vel biennis) glabra; caulibus gracilibus plus minusve ramosis foliosissimis strictis circa 3 dm. altis; foliis linearibus sessilibus acutis ad 4 cm. longis et 2 mm. latis; pedunculis aphyllis usque ad 6 cm. longis; racemis simplicibus vel 1-2-furcatis circa 1 dm. longis; bracteis inconspicuis vix 1 mm. longis; pedicellis fructiferis 5-6 mm. longis haud valde patentibus vel interdum suberectis; floribus (circa 6-12) purpureis ut videtur 5 mm. longis; capsula 4-4.5 mm. longa sepalis subrotundatis fere duplo longiore; seminibus globosis opacis minutissime et obtuse tuberculatis.—Peru: Open rocky slope, Quive, Lima, Pennell 14299 (type, Field Museum).

Apparently this plant is very similar to *C. lingulata* from the same region, but it appears to be distinguishable by the conspicuously elongate capsules. There are no perfect flowers in my material.

Portulaca Haughtii, spec. nov., annua ut videtur erecta circa 8 cm. alta, superne plus minusve patenter ramosa, axillis longe albo-pilosis; foliis sparsis alternis in sicco mediocriter persistentibus sublinearibus sessilibus vix acutis ut videtur subteretibus glabris plerumque 10-15 mm. longis, 1-1.5 mm. latis; internodiis 5-15 mm. longis; capitulis haud dense albo-pilosis (pilis 3-5 mm. longis) bracteis (foliis superioribus) circa 10 involucratibus ad 1 cm. longis 3-5-floris; calyce supra rupturam 3 mm. longo, lobis basi connatis triangularibus acuminatis rubescentibus; corolla flava vix ad 4 mm. longa, petalis oblongo-ellipticis, abrupte acutis; staminibus circa 10; stylo supra medium quadrifido; capsula globosa, vix 2 mm. diametro, breviter stipitata paulo infra medium circumscissa; seminibus brunneis 0.35 mm. diametro, acute et minute tuberculatis, tuberculis elevatis circumcirca vix manifeste stellatim radiantibus.—Peru: North of Pariñas Valley, Piura, March 25, 1929, Oscar Haught F-180 (type, Field Museum).

Among Peruvian species this *Portulaca* keys to *P. lanuginosa*, which has procumbent stems, shorter leaves, and many stamens. Species other than Peruvian with brown seeds and yellow flowers that have come to my notice all seem, from description, to be obviously different from this plant, with the possible exception of *P. Milleri* of Margarita, which has more numerous leaves and stamens and a six-parted style.

Portulaca tingoensis, spec. nov., annua erecta vel suberecta basi ramosa 5-10 cm. alta; ramis simplicibus plus minusve rubescentibus in sicco fere 2 mm. crassis, apice (sub involucrio) valde incrassatis; internodiis 1-2 cm. remotis; foliis alternis inferioribus deciduis laxis fere ignotis sed ut videtur oblongo-spathulatis subteretibus circa 1 cm. longis, superioribus similibus paucis ad 2 vel aliquid

3.5 mm. latis; floribus ignotis; capsulis plerumque capitato-confertis terminalibus sed etiam solitario-axillaribus cum pilis sordide albis 5–7 mm. longis dense involutis, 2–3 mm. longis medium versus circumscisse dehiscentibus; seminibus circa 0.6 mm. diam. atropalescentibus obtuse stellato-tuberculatis.—Peru: Arequipa, open, sandy and rocky slopes, Tingo, *Pennell 13111* (type, Field Museum).

A plant of dubious specific standing, evidently allied to *P. pilosa* and its numerous variants. However, as far as other Peruvian specimens are concerned, its metallic-lustrous seeds and its habit distinguish it readily enough.

Gynandropsis gracilis (Tr. & Pl.), comb. nov. *Cleome gracilis* Tr. & Pl. Prodr. 1: 74. 1862.

Gynandropsis macrothyrsis (Tr. & Pl.), comb. nov. *Cleome macrothyrsis* Tr. & Pl. Prodr. 1: 72. 1862.

Gynandropsis puberula (Tr. & Pl.), comb. nov. *Cleome puberula* Tr. & Pl. Prodr. 1: 71. 1862.

It is entirely apparent from a reference to the above-cited work that the authors did not regard *Gynandropsis* as a genus distinct from *Cleome*, and the fact is emphasized by their own transfer of species described in the former to the genus *Cleome*. To accredit the above names to *Gynandropsis* with Triana & Planchon as authority is therefore an error that the authors could not sanction. I think, however, that the genus is acceptable and express this opinion in the case of the above species, which have come to notice in the course of study of some related Peruvian forms, and the type collections of which I have seen.

Echeveria Harmsii, nom. nov. *Oliverella elegans* Rose, Bull. N. Y. Bot. Gard. 3: 2. 1903, not *E. elegans* Rose, 1905. *Cotyledon elegans* N. E. Br. Bot. Mag. 131: pl. 7993. 1905. *E. elegans* Berger, Pflanzenf. ed. 2. 18a: 472. 1930.

As I have had occasion to point out at least once in nearly every paper published by me, the transfer of a specific name into a genus that already contains the same name is not in accord with accepted nomenclatorial custom. The plant *Oliverella elegans*, therefore, when treated as an *Echeveria*, requires another specific designation because there is already an *Echeveria elegans*. This seems to be a nomenclatorial maneuver which is so simple, sensible, and natural that it is liable to be followed always, supported by botanical opinion regardless of what future law-tinkerers may decide to do about it. With some confidence, therefore, I make this particular name change, and with much pleasure select a new name for this beautiful plant.

Escallonia Atahuallpae, spec. nov., arbor 10–15 m. alta; ramis brunneis adultis nudis valde in laminas papyraceas exfoliatis, ramulis novellis granulo-tomentulosis; foliis lanceolatis basi apiceque cuneato-attenuatis acutis minutissime denseque denticulatis glabris vel glabratis sessilibus (vel interdum in petiolum breviter decurrentibus) demum circa 10 cm. longis, 2.5 cm. latis, saepius minoribus; racemis pendulis terminalibus simplicibus circa 1 dm. longis parce glandulosis; bracteis setaceis contortis 3–5 mm. longis; pedicellis circa 4 mm. longis; calycis laciniis triangularibus acutis vix 2 mm. longis; petalis erectis oblongis 3 mm. longis; receptaculo cupulato; stylo 3 mm. longo, stigmatibus peltatis; antheris fere 2.5 mm. longis filamenta perbrevia multo superantibus; capsula ignota.—Peru: Gravelly river valley, Tambo de Pariocota, Ancash, Oct. 8, 1922, *Macbride & Featherstone 2541* (type, Field Museum).

The generic character of *Escallonia* calls for elongate slender filaments; in the species described above they are very much shorter than the conspicuous large anthers. If it were not for the fact that two botanists of reputation have kindly verified my reference of the plant to *Escallonia*, I should be inclined to think that again I have described a species in the wrong genus. The tree simulates *E. pendula* in aspect, but the narrower leaves are glabrous and the flowers are considerably smaller.

Whether King Atahuallpa murdered his brother or merely defended himself, his famous name may appropriately be perpetuated in the botany of the land of the Incas. Anyway, it may be mentioned, for the pleasure of the cynics, that it would not be the first time that a plant has been named for a reprobate.

Desmodium immerens, spec. nov., erectum vel fere erectum ad 6 dm. altum; caulibus superne petiolis foliisque plus minusve pilosis vel interdum glabratibus; stipulis liberis longe acuminatis; petiolis 3–4 cm. longis; foliolis 3 late ovatis vel rotundato-ellipticis vel ovato-lanceolatis, apice rotundatis vel raro acutis semper apiculatis; racemis laxis 1–2 dm. longis; pedicellis fere 2 cm. longis; floribus pallide rubro-purpureis 8–9 mm. longis; calycis labio superiore integro ovato vix 3 mm. longo; vexillo exauriculato late obovato emarginato ad basin late cuneato sed haud unguiculato medio 6 mm. lato, 8 mm. longo; alis carinam subaequantibus circa 8 mm. longis, 3 mm. latis; leguminibus breviter stipitatis, leviter arcuatis, sutura superiore definite, inferiore profunde sinuata; articulis plerumque 5 prehensili-pubescentibus 8 mm. longis, 5 mm. latis.—Peru: Muña, Dept. of Huánuco, *Macbride 4000* (type, Field Museum). Yanano, Dept. of Huánuco, *Macbride 3725*.

Not a *Meibomia*, as restricted by Schindler, because of the sessile, not at all clawed standard, nor a *Nephromeria*, because of the numerous pod segments, this plant must be considered a true *Desmodium*,

and in that group it seems to approach closely only *D. affine* Schl., the pods of which are exactly straight on the upper edge. The existence of these collections, which, incidentally, have caused me no end of trouble for which only my own limitations may be blamed, appears to support the opinion expressed in a former paper that *Desmodium* may rightly include the groups *Meibomia* and *Nephromeria* as sections.

Parosela Sawadae, spec. nov., fruticosa ut videtur erecta sed diffusa et laxa ramosa; ramulis puberulis demum glabris parce glandulosis; stipulis setaceis glabris; foliolis plerumque 11, petiolatis ellipticis 4–5 mm. longis, 2–3 mm. latis, supra glabris subtus puberulis et plus minusve pallide glanduloso-punctatis; spicis longe pedunculatis vel interdum subsessilibus demum 4–8 cm. longis; bracteis glabris paullo et obscure punctatis persistentibus caudato-acuminatis 4–6 mm. longis; calycis dentibus inaequalibus basi ipsa ovatis superne fere spinuloso-subulato-apiculatis tubo dense villosa et valde nervato subaequilongis ad circa 2 mm. longis; floribus circa 8 mm. longis; carina alisque ut videtur albis, vexillo purpureo.—Peru: Huánuco, *Sawada P11* (type, Field Museum). San Rafael, Dept. of Huánuco, *Sawada P112*.

Mr. Sawada's continued interest in the flora of Huánuco is hereby, with pleasure, given merited recognition.

As specific lines are drawn in this genus at present, it is necessary to add another name to take care of this diverse form. It is *P. nova* as previously interpreted by me, at least in part, but it is not *Dalea nova* Ulbrich, a species similar in foliage and pubescence but with a very different calyx, the teeth minute.

I notice that some one has proposed that *Dalea* supplant *Parosela* by adding the former name to the list of nomina conservanda. This proposal is admission that the question as to which name is really "correct" under the Rules can not be determined clearly enough to make the decision satisfactory to every one. Therefore one name or the other must be "conserved" and, in the spirit of the Rules of course the one to choose, other considerations, as here, being about equal, is the one under which fewer species have been described. One of the factors that could be employed in making such a decision is commonly known as "common-sense."

Astragalus Dielsii, spec. nov., subcaulis dense caespitosus 2–3 cm. altus sericeo-pilosus demum glabratus; stipulis vaginantibus valde imbricatis persistentibus; foliis 8–10 mm. longis, 5–7-jugis, foliolis confertissimis vel demum distinctis sessilibus obovatis retusis vix 1 mm. longis; floribus solitariis brevissime pedicellatis 8 mm. longis pallide caeruleis; bracteis membranaceis circa 1 mm. longis;

calycis dentibus anguste triangularibus circa 1.5 mm. longis tubo oblongo-campanulato fere duplo brevioribus, dense cum pilis sericeis albis et nigris intermixtis pubescentibus; vexillo subrotundato 6-7 mm. lato; alis 3-4 mm. longis; legumine subovoideo, 3 mm. longo, 2 mm. lato, apiculato chartaceo glabro (vel fere) dorso sulcato biloculari, loculis ut videtur monospermis.—Peru: Yanashallos, west of Huallanca, Dept. of Ancash, over 5,000 m., Oct. 2, 1922, *Macbride & Featherstone 2479* (type, Field Museum).

Peruvian *Astragali* are either extremely local or variable; few are completely known and many are misinterpreted because compared with misdetermined material. This tiny plant appears to be truly comparable to only two Andean species (which, it happens, are among the few not seen by me): namely, *A. alpamarcae* Gray and *A. casapaltensis* Ball. From the former it differs, as to description, by the fewer and smaller leaflets that are densely and equally pubescent on both sides until in age equally glabrate on both surfaces, and by the narrower, longer, and densely pubescent calyx tube; from the latter by the distinctly fewer leaflets and by the shorter calyx teeth in proportion to the tube.

This silvery-pubescent, closely tufted little plant grew without competition on loose stony slopes, and when collected its pale blue flowers were all but hidden by a light fall of snow.

Astragalus Pilgeri, spec. nov., suffrutex humilis laxe caespitosus subglaber; caulibus diffusis 1-4 cm. longis; foliis viridibus minutissime parceque hispidulis 4-8-jugis (plerumque 6) circa 1.5 cm. longis, foliolis 2-3 mm. longis obovatis retusis conduplicatis; stipulis parvis solum ad basin connatis; floribus 7 mm. longis perbrevis racemosis ad apicem pedunculi axillaris folio interdum multo vel interdum paullo brevioris; calyce parce pilis brevibus nigris pubescente 2-2.5 mm. longo, laciniis triangulari-subulatis quam tubo campanulato distincte brevioribus; vexillo subrotundato fere 5 mm. lato; ovario circa 5-ovulato.—Peru: Hacienda Chuchapaya, Valle del Paucartambo, 3,800 m., Feb., 1929, *Herrera 2315* (type, Field Museum).

Perhaps nearest *A. micranthellus* Wedd. among species recorded from Peru, but very distinct in its green, retuse leaflets, free stipules, and larger flowers. It has a superficial resemblance to *A. Hieronymi* Ulbr., but the smaller flowers and short, triangular calyx teeth readily separate it.

Astragalus salubris, spec. nov., pusillus dense caespitosus subpatenter canescenti-strigosus vel subvillosus; caulibus ad 2 cm. longis; stipulis vaginantibus valde imbricatis; foliis numerosissimis longe (circa 1 cm.) petiolatis, plerumque 3-4 cm. longis, erecto-patentibus 10-12-jugis; foliolis ellipticis obtusis vel paullo retusis circa 3 mm. longis, fere 1.5 mm. latis conduplicatis supra glabris;

spicis subsessilibus 6–8 mm. longis; floribus 4–6 ut videtur purpureis vix 6 mm. longis; calycis nigro-pubescentis fere 4 mm. longi dentibus subulatis tubo suboblongo distincte brevioribus; vexillo late obovato 3.5 mm. lato; ovario biloculari, loculis monospermis.—Peru: Cerro de Pasco, Oct. 28, 1927, *Sawada P86* (type, Field Museum).

Very possibly this thrifty, hardy form should be included in one of the several Andean species that are all so similar in general and yet not quite alike. Its subspreading pubescence, however, separates it from most species. In many respects it resembles *A. Brackenridgei* Gray, but that, typically, at least, has larger, oblong leaflets and longer, peduncled spikes with more flowers. The calyx bract of *A. salubris* is white, rather than black-pubescent.

Pithecolobium Merrilli, nom. nov. *P. multiflorum* Merr. Phil. Journ. Sci. Bot. 10: 11. 1915, not Benth. in Hook. Lond. Journ. 3: 320. 1844.

The earlier use of the name *multiflorum* by Bentham for a Brazilian species in this genus is not recorded in the *Index Kewensis*. The Philippine plant described by Merrill may most appropriately bear the name of its well-known author.

Acalypha Hookeri, nom. nov. *A. cordifolia* Hook. f. Trans. Linn. Soc. 20: 186. 1847, not Griseb. Abh. Ges. Wiss. Gött. 24: 60. 1879.

Pax, contrary to usual botanical nomenclatorial practice, has retained the synonymous name *A. flabellifera* Rusby for the Grisebach species of Argentina and Peru. It is, of course, the more recently described *A. cordifolia* of the Galapagos Islands that requires another name.

Briquetina, gen. nov. Calyx breviter 4–5-lobus. Petala 5, valvata, libera, oblonga, lamina medio incurva et inflexa, laevigata, intus linea longitudinali elevata praedita et etiam ad medium transverse incrassata. Stamina 5 petalis paullo breviora et eis alterna, filamentis superne valde dilatatis glabris; antherae erectae, loculis ovato-oblongis, connectivo haud crasso. Discus nullus. Ovarium liberum, 1-loculare; stylus brevis, conicus, stigmatibus subdiscoideo; ovula 2 ut videtur vulgo 1 evolutum, pendulum, altero ante anthesin abortiente. Fructus drupaceus subglobosus, endocarpio lignoso. Arbores. Folia integerrima, coriacea, penninervia. Flores parvi spicati, spicis brevibus in racemos elongatos dispositis.

Briquetina incarum, spec. nov., arbor magna; ramis teretibus glabris, cortice pallide brunneo nitidulo longitrorsum rimoso; ramulis pedunculisque glabratis vel sparse puberulis; petiolis crassis, 7–10 mm. longis; foliis fere ellipticis vel late ovato-ellipticis, basi plus minusve obliquis, apice breviter obtuseque acuminatis, plerumque circa 1.5 dm. longis et 6–8 cm. latis, supra paullo nitidulis, subtus

opacis glabris vel interdum cum pilis crispis brevibus pilosis, tenuissime cartilagineo-undulato-marginatis; nervis medio lateralibusque primariis supra vix notatis, subtus cum venis transversis valde conspicuis; inflorescentiis 5–13 cm. longis, laxis, angustis, fructiferis raro 2 cm. latis, ramulis 0.5–1 cm. longis dense floriferis valde recurvato-incurvatis; floribus sessilibus flavo-viridibus satis fulvo-pilosis; petalis glabris minutissime papillois suboblongis circa 1.25 mm. longis ad medium definite angustatis et margine inflexis; nervis (vel lineis) mediocriter prominentibus vel elevatis ad medium laminarum incrassato-contractis sed appendicibus destitutis; filamentis glabris, late cuneatis; ovario ovoideo; drupa ellipsoidea obtusa circa 1 cm. diam.—Peru: Muña, Dept. of Huánuco, about 2,200 m., May 23–June 4, 1923, *Macbride 4050* (type, Field Museum). Yanano, Dept. of Huánuco, about 2,000 m., May 13–16, 1923, *Macbride 3748*.

It is rather astonishing if this handsome tree, which I found growing on open rocky hills in central Peru, is really undescribed. It is quite possible that it has already received a name in some family other than the Icacinaceae in which I place it, especially in view of the fact that this family for a long time was a part of another now generally regarded as far removed. But its characters, kindly verified for me by Dr. Briquet, certainly seem to forbid its reference to any other group, and in this family it is not referable to any genus as described. The feature most obviously at variance is probably the inflorescence, which is unusually open and elongate for the family, the flowers more generally being borne in rather close cymes, often paniced. Perhaps it is nearest *Poraqueiba* Aubl. but the petals in that genus are ciliate-appendaged across the middle; *Mappia* Jacq. has pubescent petals and filiform filaments; *Kummeria* Mart. pubescent filaments; and so the list could be extended to include also the new genera described recently for the Amazon region. In addition to these floral differences which traditionally separate genera in the family, there is always for our plant the distinctive inflorescence.

So it has seemed necessary to propose a new genus for it; and in choosing the name *Briquetina* I give myself the pleasure of honoring one to whom botanical honor is so abundantly due.

Paullinia Williamsi, spec. nov., scandens fruticosa subglabra; ramis trigonis leviter vel obsolete striatis; foliis 5-foliolato-pinnatis; petiolis 2–5 cm. longis, 4-sulcatis vel interdum anguste marginatis, parce pulverulentis et ciliato-hirsutulis; rhachidibus conspicue alatis 5 mm. latis; stipulis prominentibus lineari-lanceolatis acuminatis, 7–17 mm. longis; foliolis ovato-lanceolatis subsessilibus vel breviter petiolatis, acute acuminatis, subintegris vel plerumque praesertim ad apicem remote 3–5-dentatis, laxe reticulato-venosis, utrinque

opacis subtus minutissime punctatis, 3–3.5 cm. latis, 8–10 cm. longis; inflorescentiis solitariis, 2 vel 3 cm. longis, molliter puberulentis, ramulis brevissimis, 3–5-floris; pedicellis ad 3 mm. longis; floribus circa 4 mm. longis; sepalis minutissime pulverulentis exterioribus 1.5, interioribus 3 mm. longis; petalis ad basin pilosis.—Peru: Maquisapa on the upper Río Nanay, Loreto, July, 1929, *L. Williams* 1196 (type, Field Museum).

In the absence of fruit the relationship of this vine is unknown, but in aspect it resembles strikingly *P. laeta* and *P. subauriculata*, from both of which it nevertheless is at once distinguishable because of the acutely acuminate leaflets, the large stipules, and the triangular stems.

Serjania elongata, spec. nov., fruticosa floribus exceptis glabra; ramis teretibus obscure striatis nitidis; petiolo communi 6–8 cm. longo; foliis 5-foliolato-pinnatis; foliolis integris vel interdum obscure 1–3-undulato-dentatis, late ellipticis, lateralibus breve petiolatis basi apiceque obtusissimis vel rotundatis, terminalibus similibus sed ad basin cuneato-contracto-petiolatis, circa 6 cm. latis et 10 cm. longis, utrinque satis reticulatis nitidulis chartaceis, punctis vel lineolis pellucidis minutissimis et vix notatis; petiolis omnibus nudis; inflorescentiis racemiformibus solitariis tenuibus longe (6–8 cm.) pedunculatis, 2.5–3 dm. longis, laxifloris glabris vel fere glabris; ramulis inflorescentiarum 2–4 mm. longis; floribus circa 4-fasciculatis, pedicellis gracilibus vix 2 mm. longis; sepalis exterioribus glabris circa 2 mm. longis, interioribus paullo tomentulosis, 2.5 mm. longis; petalis glabris (intus ad basin paullo barbatis) obovatis circa 3 mm. longis; filamentis breviter pilosis.—Peru: In sunny brush; flowers cream-colored; La Merced, Junín, Aug., 1923, *Macbride* 5511 (type, Field Museum).

Without even young fruit, the generic position of the vine is open to question. I think it is probably a *Paullinia*, but it resembles not at all any species in the nearly complete collections assembled at Munich by Radlkofer. The apparent absence of tendrils and the subpinnate leaves suggest that genus more than *Serjania*, but there is an almost exact simulation in the leaflets of *S. foveolata* and a close approach to those of *S. nutans*, both species with ternate or biternate leaves.

Gustavia caballoensis, spec. nov., arbor; foliis ut videtur ad apicem ramulorum congestis subsessilibus (petiolis 1–3 mm. longis) chartaceo-coriaceis glabris plus minusve praesertim ad apicem undulato-crenulato-serratis oblongo-elliptico-oblongeolatis inferne arcuatum vel interdum cuneatim gradatim reductis, circa 3 dm. longis, basi ipsa subrotundata circa 1.5–2 cm. latis, supra medium 8–12 cm. latis, apice breviter acuminatis obtusis; nervis lateralibus circa 12 supra et subtus mediocriter prominentibus ut etiam venulis tenuissime reticulatis; floribus solitariis axillaribus; pedicellis demum 2.5 cm. longis ad basin 1–3-bracteolatis, ad apicem bibracteolatis;

bracteolis rotundatis 2–4 mm. longis; calycis pulverulenti margine integro vel obscure crenulato; petalis ut videtur subaequalibus late obovatis vel obovato-oblongis 3–3.5 cm. longis pulverulentis; antheris vix 3 mm. longis; fructus subglobularis apice truncatus circa 4 cm. diam.—Peru: Caballo-cocha, Loreto, Aug., 1929, *L. Williams 2240* (type, Field Museum), 2152, 2236(?).

The last collection, in bud and with a section of an immature fruit (from which the description is drawn), has longer leaves with about 20 lateral nerves.

This material very doubtfully represents a new species, but rather than modify the character of any one of the several described forms to which it could thereby be referred, and so perhaps cause confusion, I give it a name. It bears a striking resemblance to *G. Marcgraviana*, *G. Ulei*, and (presumably from description) *G. Poeppigiana*. These three species, however, all have terminal flowers, more or less evidently racemose. The first, with exactly the foliage of this, grows in eastern Brazil, and its terminal flower or flowers seem to have slightly longer anthers. The second and third, which are not clearly distinct from each other, have subsessile or shortly pediceled, terminal flowers. In this connection *G. insignis* Linden ex Hook. Bot. Mag. 84: pl. 5069. 1858 may be mentioned. Miers in his treatment of the genus, Trans. Linn. Soc. 30: 177. 1874, refers it to *G. superba* Berg. The latter, however, has long-petioled leaves. The former has the subsessile leaves of our plant but they are "spinulose-serrate," and the calyx is somewhat lobed; otherwise it approaches *G. caballoensis*. No *Gustavia* already collected in Peru is comparable to the one here described, with the possible exception of *G. longifolia*, which has the pedicels bracteate below the middle.

Gustavia mangua, spec. nov., arbor(?); ramulis ignotis; petiolis 5–10 mm. longis; foliis oblongo-lanceolato-oblanceolatis in petiolum longe sensim angustatis basi ipsa acutis, supra medium gradatim latioribus plerumque 6–8 cm. latis, sursum angustioribus et in acumen acutum anguste productis, 3–4 dm. longis, rigide chartaceis, margine subintegris vel distanter crenulato-serrulatis, valde crispato-plicatis; nervis tenuibus supra vix prominulis subtus stramineis et prominentibus glabris, venis transversis tenuissime reticulatis; ut videtur cauliflora; racemis circa 2.5 cm. longis multifloris; bracteis numerosis ovato-acutis 3 mm. longis; pedicellis gracilibus minute pulverulentis paullo sub medium bibracteolatis, 3–3.5 cm. longis; calycis margine integro vel obsolete 4-lobato; petalis circa 8, oblongo-obovatis circa 2.5 cm. longis 7–10 mm. latis, pulverulentis; antheris 2 mm. longis.—Peru: Lower Río Nanay, Loreto, May–June, 1929, *L. Williams 281* (type, Field Museum).

"Mangua," the native name, may serve also as the specific one for this tree which, among Peruvian species at least, resembles most *G. augusta*, from which its almost caudate-acuminate leaves and small flowers readily distinguish it. Its character seems to be definitely at variance with that of any species as described by Miers in his treatment of the genus, Trans. Linn. Soc. 30: 175-188, 1874, as well as with any of the few proposed since that date. Miers' work, however, is not entirely intelligible to me, and I do not know how much reliance can be placed in his alignment.

Grias Neuberthii, spec. nov., arbor(?); ramis ramulisque ignotis; foliis ut videtur sessilibus oblongo-spathulatis maximis breviter acuminatis, sensim ad basin angustatis, supra medium latissimis, majoribus ad 8 dm. longis et 1.5 dm. latis, integris vel leviter undulato-crispatis glabris paullo nitidulis subcoriaceis; nervis lateralibus circa 25 plerumque alternantibus supra vix notatis subtus valde prominentibus, venis utrinque mediocriter prominulo-reticulatis; racemis (e trunco nascentibus?) ut videtur ad 1 dm. longis cinereo-tomentulosis; bracteis 1 cm. longis; pedicellis subangulatis crassis bracteis vix longioribus; bracteolis calycibusque sericeo-tomentulosis; calycibus bibracteolatis (bracteolis oblongis obtusis 8 mm. longis) lobis 4 subrotundatis circa 7 mm. longis; petalis 4 crassis subovalibus circa 3 cm. longis; filamentis crasso-angulatis; antheris oblongis, circa 1 mm. longis; thecis connatis longitrorsum dehiscentibus.—Peru: Caballo-cocha, Loreto, Aug., 1929, *L. Williams 2337* (type, Field Museum).

This tree is immediately distinct from all of the few species described in the genus *Grias* by its inflorescence and connate anthers, but because it is aberrant in character, it is possible that it has been referred to *Gustavia*, most of the species of which are unknown to me. The latter genus, however, has anthers dehiscent by terminal pores, but the cells are connate in the manner of those of this plant. As the androecium is equally expanded, there is no choice of genera, granted that the plant has been placed in the right family, except these two, and as the method of anther dehiscence is the diagnostic character for the genera, there appears to be no reason for including it in *Gustavia*. The material, unfortunately, is poor, the inflorescence being badly broken, and its attachment not indicated. The leaves, broken off above the base, are similar, except for being subopaque, to those of *Grias grandifolia*, a species with glabrate, small-bracted inflorescence and subglobose, separate anthers, as typical for the genus. The native name, "chope," has been recorded also for species of *Gustavia*.

In naming this interesting species for Carl Neuberth, Custodian of the Herbarium of Field Museum for more than thirty years, well-merited recognition is given a conscientious botanical worker.

Combretum Llewelyni, spec. nov., fruticosum (scandens?); ramulis foliis subtus petiolisque parce rufo-lepidotis; petiolis circa 5 mm. longis; foliis supra glabris nitidis subchartaceis late ellipticis vel fere subrotundatis, apice abrupte caudato-acuminatis, 8–10 cm. longis, 5 cm. latis; nervis lateralibus 6–7, supra mediocriter subtus alte prominentibus ad marginem curvatis et cum venis plus minusve definite reticulatis; spicis terminalibus circa 2 dm. longis; calyce 17 mm. longo rubido-lepidoto e basi anguste campanulata vix vel haud constricto, lobis anguste triangularibus basi vix 3 mm. latis, 5–6 mm. longis, acuminatis intus parce lanato-villoso; petalis fere linearibus circa 2 mm. longis; staminibus calycem circa duplo superantibus; samara ignota.—Peru: Along Río Itaya, Loreto, *Llewelyn Williams 143* (type, Field Museum).

Only *C. Loefflingii* Eichl. and *C. Baslerianum* Mildbr. have calyces that even approach the exceptionally elongate, narrowly toothed ones of this attractive shrub. *C. Llewelyni* also has narrower petals and much broader leaves.

Gunnera peruviana, spec. nov., maxima; ligulis linearibus, remote spinuloseque dentatis; petiolis circa 3 dm. longis foliisque subtus haud spinescentibus sed plus minusve cum pilis spinuliformibus pilosis demum glabris; foliis supra conspicue bullato-rugosis valde scabris vix tuberculatis rotundato-cordatis minoribus circa 3 dm. latis et plerumque prostratis vel adscendentibus, majoribus erectis magnificisque perbreve 5–7-lobatis, lobis late rotundo-ovatis fere integris solum repando-undulatis et minutissime denticulatis; inflorescentiis sessilibus dense spinuloso-pilosis circa 3.5 dm. longis fere oblongis, ramis remotis (rare attingentibus) patentibus plerumque 5–6 cm. longis; bracteis persistentibus conspicuis 1–2 cm. longis irregulariter spinuloso-dentatis glabris anguste ovato-lanceolatis longe acuminatis apice haud vel vix dilatatis; sepalis haud notatis; ovario subgloboso.—Peru: Tambillo, Dept. of Huánuco, May 8, 1923, *Macbride 3583* (type, Field Museum).

So many *Gunneras* have been described which, at least from description, appear to be very similar that one would suppose there must already be a name for every form. But this seems not to be the case and, if there is any constancy in the described characters, it becomes necessary to give new names to the above and following plants. *G. peruviana* is more than likely *G. scabra* R. & P. as to the Muña, Peru, specimen cited by the authors but not as to description, plate, or the Chilean material, which is *G. chilensis* Lam. The latter differs from this plant in its dense inflorescence and deeply, narrowly lobed and acutely serrate leaves. Also, the related *G. Berteroi* Phil. and *G. manicata* Lind. differ from *G. peruviana* decidedly in their leaf dentation. Yet other forms, as *G. rheifolia* Schindl. and *G. commutata* Blume, are otherwise distinct enough, as, for instance,

in their dense inflorescences. If the sepals could be determined as persistent, a comparison could be made with *G. pilosa* Kunth, *G. boliviana* Morong, and *G. apiculata* Schindl., but the spines and pilosity of the first are lacking, as are the smooth leaves of the second, and the acutely lobed foliage and dense inflorescence of the third. Since Schindler monographed the family for *Pflanzenreich* he has described *G. Margaretae* and *G. Annae*, both from Peru but both ebracteate or nearly so and with narrowly or acutely lobed leaves.

Gunnera Bolivari, spec. nov., ut videtur maxima; ligulis ignotis; petiolis inflorescentisque ubique rubro-purpureis glabris vel glabris; foliis haud profunde obtuseque 5-7-lobatis et obscure repando-dentatis supra viridibus glabris et laevigatis subtus pallidioribus solum ad nervos parce tenuissime pilosis, ut videtur magnis; inflorescentiis ut videtur ebracteatis (bracteis minutis) paullo attenuatis ad apicem longe (fere 1 dm.) pedunculatis circa 3.5 dm. longis, 8-10 cm. latis; ramis valde patentibus numerosis sed haud congestis gracilibus fructiferis vix vel paullo incrassatis, plerumque 5 cm. longis; sepalis aliquid persistentibus; ovario ovoideo.—Peru: Cerro de Cusilluyoc, Dept. of Cuzco, *Pennell 13989* (type, Field Museum).

Apparently very distinct from known species because of its glabrous, essentially ebracteate inflorescence and glabrate leaves, with the possible exceptions of *G. pyramidalis* Schindl. of Juan Fernández, which is more pubescent and has a very pyramidal inflorescence, and *G. Margaretae* Schindl., which has narrowly lobed leaves.

Bowlesia flabilis, spec. nov., annua suberecta glabrata 2-2.5 dm. alta; caulibus foliisque viridibus sed (praecipue foliis subtus) parce cum pilis plus minusve stellato-ramosis pubescentibus; petiolis (inferioribus) circa 2 cm. longis; foliis circa 1.5 cm. longis, late ovatis vel subrotundatis, basi cordatis, late 5-lobatis, lobis integris mucronulato-acutis; foliis superioribus valde sed gradatim reductis, 3-lobatis vel subintegris, circa 1 cm. longis vel bracteiformibus et 3-5 mm. longis; inflorescentiis sessilibus simplicibus 1-4-floris; fructu nudo sed valde glochidiato-ciliato fere 2.5 mm. longo et circa 2 mm. lato.—Peru: Wood-clearing, Mito, Huánuco, July 23-Aug. 14, 1922, *Macbride & Featherstone 1718* (type, Field Museum).

Among *Bowlesias* with glochidiate fruits this resembles most *B. tenella*, from which its 3-lobed or subentire and greatly reduced upper leaves distinguish it. Its name refers to its habit of growth, to its habitat, and to its specific standing. The last characteristic, however, is shared with most species of *Bowlesia*; quite possibly they are all reducible to about two.

Hydrocotyle Dahlgreni Rose & Macbr., spec. nov., caulibus pedunculis petiolisque plus minusve rufo-hirsutis; caulibus 1-2 mm.

crassis; petiolis 2-3 cm. longis, lamina reniformi-cordata vel suborbiculata usque ad 5 cm. lata lobulato-crenata, lobulis truncatis haud prominentibus, vel manifeste lobata, supra parce adpresseque hirsutula, subtus tenuiter strigillosa; pedunculis circa 1 dm. longis; inflorescentiis simpliciter umbellatis multi(60-80)-floris, circa 2 cm. diam.; pedicellis filiformibus 6-8 mm. longis; petalis ovatis, 1 mm. longis; fructu circa 1.5 mm. crasso orbiculato-reniformi.—Peru: On moist sunny banks at Cueva Grande near Pozuzo, Huánuco, June 23, 1923, *Macbride 4776* (type, Field Museum).

Because of the conspicuous, long, coarse pubescence this plant at once suggests *H. Barbarossa* Cham., which, however, has peltate and lobed leaves. Among species with the leaves not peltate few seem near enough in character to merit comparison, but perhaps *H. callicephala* Cham. with much longer petioles and lobed leaves and the recently discovered *H. tambolomensis* Wolff with much finer pubescence and lobate leaves are related.

Dr. Rose proposed naming this plant for the collector. I have, therefore, felt it my privilege to change the name and share in the publication. Apparently an unusually distinct species, it gives me pleasure to name it for a botanist who is first a scientist.

Weigeltia nanayensis, spec. nov., fruticosa pumila; ramulis glabris praeter apicem minute parceque rufo-lepidotis; petiolis 1.5-2 cm. longis; foliis elliptico-lanceolatis basin versus gradatim attenuatis, apice plerumque acuminatis, circa 1.5 dm. longis, 5 cm. latis, chartaceis utrinque prominulo-reticulatis; punctulis paucis subtus vix notatis; racemis densifloris circa 2 cm. longis; pedicellis bracteolis multo brevioribus circa 2 mm. longis; floribus 4-meris vix 2.5 mm. latis; lobis calycinis ovato-acutis plus minusve dense nigro-punctatis ut etiam petalis duplo longioribus obtusis; staminibus petalis subaequalibus, filamentis alte insertis gracilibus, antheris subrotundatis haud emarginatis vel punctulatis dorso medio affixis.—Peru: Lower Río Nanay, *Williams 658* (type, Field Museum).

A specimen in bud from the same locality (657) is probably the same. It has broader leaves (to 6.5 cm.) and erect inflorescences about 5 cm. long. The species is rather aberrant in *Weigeltia*, but its regularly lobed calyx and its roundish, dorsally fixed anthers seem to forbid referring it to any other genus, though the superficial resemblance to *Cybianthus psychotrifolius* Rusby is striking. Perhaps only one genus is concerned, as at one time considered. Even so, this shrub is distinguishable from Rusby's by its very thin, reticulate, sparsely punctate foliage.

Stylogyne amplifolia, spec. nov., arbuscula glabra; foliis ellipticis vel oblongo-ellipticis breviter acuminatis basi late cuneato-acutis plerumque 1 dm. latis et 2.5-3 dm. longis, integerrimis vel

leviter undulato-crenulatis, chartaceo-coriaceis supra aliquid nitidis venis paullo notatis, subtus densissime reticulato-venosis, utrinque plus minusve dense punctatis; petiolis circa 1 cm. longis antice valde alatis; inflorescentiis axillaribus et lateralibus solitariis vel fasciculatis paucifloris vix 1 cm. longis; floribus ignotis ut videtur racemoso-umbellatis; bracteolis persistentibus anguste ovatis acutis circa 1.5 mm. longis; pedicellis fructiferis ad 5 mm. longis; sepalis plerumque 5 breviter connatis vix 1.5 mm. longis ovatis obtusis dense glandulose lineatis, punctis valde elongatis, margine fere nudis membranaceis haud ciliolatis; drupis globosis fere 6 mm. crassis valde cum glandulis rubris elongatis rugulosis.—Peru: Caballo-cocha, Loreto, *L. Williams* 2117 (type, Field Museum), 2081. Lower Río Nanay, *Williams* 587(?).

Apparently this small tree is referable to *Conomorpha* or to *Stylogyne*, and I have placed it in the latter genus largely because its sepals are more typical for that group. It is only on the inflorescences (as interpreted) that it has been eliminated from other genera. These are in mature fruit and broken, but seemingly the flowers were pseudo-racemose or subumbellate. The large leaves, glabrousness, persistent bracts, and lineate (not punctate) glandulosity constitute a combination of characters apparently not described for any species in either of the genera considered.

Ditassa Schlechteri, nom. nov. *D. montana* Schlechter, Medel. Herb. Leid. 29: 13. 1916, not Decaisne in DC. Prodr. 8: 576. 1844.

The earlier use of the name *montana* in this genus precludes its acceptance for this recently discovered Bolivian species.

Blepharodon nitidum (Vell.), comb. nov. *Cynanchum nitidum* Vell. Fl. Flum. 3: pl. 74. 1827; text 121. 1825. *B. diffusum* Dene. in DC. Prodr. 8: 603. 1844.

Decaisne has referred the plant of Vellozo unquestionably to his own *B. diffusum*.

Metastelma Schlechteri, nom. nov. *M. ditassoides* Schlechter, Medel. Herb. Leid. 29: 13. 1916, not Schlechter, Notizbl. 6: 175. 1914.

In naming this Bolivian plant Schlechter evidently overlooked his own use of the same species name for a Brazilian *Metastelma*.

Tassadia Rusbyi, nom. nov. *T. Sprucei* Rusby, Bull. Torr. Club 25: 498. 1898, not Fourn. in Mart. Fl. Bras. 6⁴: 229. 1885.

It is not obvious that this Rusbyan species is referable to one previously described.

Prestonia amazonica (Benth.), comb. nov. *Haemadictyon amazonicum* Benth. in Mart. Fl. Bras. 6²: 166. 1860.

The union of *Haemadictyon* and *Prestonia* seems to be universally accepted, but I do not find that this excellent Amazonian species has been transferred.

Odontadenia anomala (Heurck & M. Arg.), comb. nov. *Anisolobus anomalus* Heurck & M. Arg. Obs. Bot. 160. 1870.

Odontadenia Benth. antedates *Anisolobus* A. DC. by three years, and this Peruvian species does not seem to have been named under the former genus.

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